



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/690,455	10/18/2000	Keiichiro Yoshihara	C14-127596M/YAH	3808

21254 7590 05/10/2004

MCGINN & GIBB, PLLC
8321 OLD COURTHOUSE ROAD
SUITE 200
VIENNA, VA 22182-3817

EXAMINER

SHAPIRO, LEONID

ART UNIT

PAPER NUMBER

2673

DATE MAILED: 05/10/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/690,455

Applicant(s)

YOSHIHARA ET AL.

Examiner

Leonid Shapiro

Art Unit

2673

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 February 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 3-5, 11-14, 16-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 5, 18 and 21 is/are allowed.
- 6) ☒ Claim(s) 3, 4, 11, 12, 16, 17, 19 and 20 is/are rejected.
- 7) ☒ Claim(s) 13-14 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

1. Claims 3-4, 11-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Satoru et al. (JP No. 07-160203) in view of Shigemura (US Patent No. 5,075,686) and Sakai et al. (US Patent No. 5,905,914).

As to claim 3, Satoru et al. teaches a vehicle-mounted apparatus, comprising a first panel including a first display, first panel being mountable onto a surface of a vehicle (See Figs 4,6,9,10,12, items 41,60a,60b,85-87 in Detailed Description See paragraph 0023, 0027, 0030); and a second panel including a second display, comprising adapting second panel to be opened and closed with respect to first display about a side thereof as an axis (See Figs 4,6-7,9-10,12, items 51,60a,60b,73,85-87 in Detailed Description See paragraphs 0023, 0027, 0029-0030).

Satoru et al. does not teach operating switch changing a function indication according to at least one of whether second panel is open/closed.

Shigemura teaches group of switches and the input functions may be changed over by opening or closing the cover (See Fig. 3, items 52-53, in description See Col. 1, Lines 35-40 and Col. 3, Lines 24-49).

It would have been obvious to one of ordinary skill in the art in the time of invention to use the change indications of input functions by opening or closing the

cover as shown by Shigemura in the Satoru et al. apparatus in order to effect change-over of the indications by moving indication member (See Col. 1, Lines 63-66 in the Shigemura reference).

Satoru et al. and Shigemura do not teach an operating switch and display panel to be open or close instead of cover of Shigemura.

Sakai et al. teaches an operating switch (See fig. 57, item 156, Col. 63, Lines 40-43) and display panel to be open or close (See Fig. 58, step 222, Col. 64, Lines 4-11).

It would have been obvious to one of ordinary skill in the art in the time of invention to use an operating switch and display panel being closed or open as shown by Sakai et al. in Shigemura and the Satoru et al. apparatus to replace cover by operating switch and display panel in order to effect change-over of the indications by moving indication member (See Col. 1, Lines 63-66 in the Shigemura reference).

As to claim 4, Satoru et al. teaches a vehicle-mounted apparatus, comprising a first panel including a first display, first panel being mountable onto a surface of a vehicle (See Figs 4,6,910,12, items 41,60a,60b,85-87 in Detailed Description See pages 4-7, paragraph 0023, 0027, 0030); and a second panel including a second display, comprising adapting second panel to be opened and closed with respect to first display about a side thereof as an axis, wherein second panel is relatable upside down (See Figs 4,6,910,12, items 51,60a,60b,85-87 in Detailed Description See pages 4-7, paragraph 0023, 0027, 0030).

Satoru et al. does not teach operating switch changing a function indication according to at least one of whether second panel is rotated upside down.

Shigemura teaches group of switches and the input functions may changed over by opening or closing the cover (See Fig. 3, items 52-53, in description See Col. 1, Lines 35-40 and Col. 3, Lines 24-49).

It would have been obvious to one of ordinary skill in the art in the time of invention to use the change indications of input functions by opening or closing the cover as shown by Shigemura in the Satoru et al. apparatus to provide improved construction of the coupling portion between an indication member and an operating member (See from Col. 1, Lines 67 to Col. 2, Line 2 in the Shigemura reference).

Satoru et al. and Shigemura do not teach an operating switch and display panel to be open or close instead of cover of Shigemura.

Sakai et al. teaches an operating switch (See fig. 57, item 156, Col. 63, Lines 40-43) and display panel to be open or close (See Fig. 58, step 222, Col. 64, Lines 4-11).

It would have been obvious to one of ordinary skill in the art in the time of invention to use an operating switch and display panel being closed or open as shown by Sakai et al. in Shigemura and the Satoru et al. apparatus to replace cover by operating switch and display panel in order to effect change-over of the indications by moving indication member (See Col. 1, Lines 63-66 in the Shigemura reference).

As to claim 11, Satoru et al. teaches a vehicle-mounted apparatus, comprising a first panel including a first display, first panel being mountable onto a surface of a

vehicle (See Figs 4,6,910,12, items 41,60a,60b,85-87 in Detailed Description See pages 4-7, paragraph 0023, 0027, 0030); and a second panel including a second display, comprising adapting second panel to be opened and closed with respect to first display about a side thereof as an axis, wherein second panel is relatable upside down (See Figs 4,6,910,12, items 51,60a,60b,85-87 in Detailed Description See pages 4-7, paragraph 0023, 0027, 0030).

Satoru et al. does not teach operating switch changing a function indication according to at least one of whether second panel is rotated upside down.

Shigemura teaches group of switches and the input functions may changed over by opening or closing the cover (See Fig. 3, items 52-53, in description See Col. 1, Lines 35-40 and Col. 3, Lines 24-49).

It would have been obvious to one of ordinary skill in the art in the time of invention to use the change indications of input functions by opening or closing the cover as shown by Shigemura in the Satoru et al. apparatus in order to provide improved construction of the coupling portion between an indication member and an operating member (See from Col. 1, Lines 67 to Col. 2, Line 2 in the Shigemura reference).

Satoru et al. and Shigemura do not teach an operating switch and display panel to be open or close instead of cover of Shigemura.

Sakai et al. teaches an operating switch (See fig. 57, item 156, Col. 63, Lines 40-43) and display panel to be open or close (See Fig. 58, step 222, Col. 64, Lines 4-11).

It would have been obvious to one of ordinary skill in the art in the time of invention to use an operating switch and display panel being closed or open as shown by Sakai et al. in Shigemura and the Satoru et al. apparatus to replace cover by operating switch and display panel in order to effect change-over of the indications by moving indication member (See Col. 1, Lines 63-66 in the Shigemura reference).

As to claim 12, Satoru et al. does not teach means for rotating upside down at least one of operating switch and function indication on operating switch when the second panel is rotated upside down.

Shigemura teaches group of switches and the input functions may be changed over by opening or closing the cover (See Fig. 3, items 52-53, in description See Col. 1, Lines 35-40 and Col. 3, Lines 24-49).

It would have been obvious to one of ordinary skill in the art in the time of invention to use the change indications of input functions as shown by Shigemura in the Satoru et al. apparatus to changing a function indication according to at least one of whether second panel is rotated upside down in order to provide improved construction of the coupling portion between an indication member and an operating member (See from Col. 1, Lines 67 to Col. 2, Line 2 in the Shigemura reference).

2. Claims 16-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Satoru et al., Sakai et al. and Shigemura as applied to claims above, and further in view of Chan et al. (US Patent No. 6,339,696 B1).

Satoru et al., Sakai et al. and Shigemura do not show means for displaying a current audio source on at least one of first and second displays.

Chan et al. teaches audio/video source within the vehicle provides video programming to the display device corresponding to the audio signal (See Figs. 1, 8, items 12, 16, 206, in description See Col. 4, Lines 32-35 and Col. 9, lines 15-22).

It would have been obvious to one of ordinary skill in the art in the time of invention to display current a video/audio source as shown by Chan et al. in the Satoru et al., Sakai et al. and Shigemura apparatus in order to satisfy the need for in-vehicle audio/video system (See Col. 1, Lines 34-35 in Chan et al. reference).

3. Claims 19-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Satoru et al., Sakai et al. and Shigemura as applied to claims above, and further in view of Narayanaswamy et al. (US Patent No. 6,144,358).

Satoru et al., Sakai et al. and Shigemura do not show means detecting a position of second panel by a predetermined angle in terms of at least one of the open/close action and rotation and means for switching an input source upon detecting.

Narayanaswamy et al. teaches means detecting a position of second panel by a predetermined angle in terms of at least one of the open/close action and rotation (See Fig. 1A and 1B, items 102, 104, 106, in description See Col. 2, Lines 16-43) and means for switching an input source upon detecting (See Fig. 2, items 202,204, in description See Col. 3, Lines 34-50).

It would have been obvious to one of ordinary skill in the art in the time of invention to detect a position of second panel by a predetermined angle in terms of at least one of the open/close action and rotation and means for switching an input source upon detecting as shown by Narayanaswamy et al. in the Satoru et al., Sakai et al. and Shigemura apparatus in order to present more usable information to the user (See Col. 1, Lines 40-43 in Narayanaswamy et al. reference).

Allowable Subject Matter

4. Claim 5, 18, 21 are allowed.
5. Claims 13-14 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Relative to independent claim 5 and claims 13-14 the major difference between the teaching of the prior art of record (JP No. 07-160203, Satoru et al.) and US Patent No. 5,075,686, Shigemura) and the instant invention is that the said prior art **does not** teach specific structures (gearing) in conjunction with multi-display with changeable function switches.

Claims 18 and 21 depend on claim 5.

Response to Arguments

6. Applicant's arguments filed on 02.11.04 with respect to claims 3-411-12, 16-17, and 19-20 have been considered but are moot in view of the new ground(s) of rejection.


Telephone inquiry

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leonid Shapiro whose telephone number is 703-305-5661. The examiner can normally be reached on 8 a.m. to 5 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bipin Shalwala can be reached on 703-305-4938. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Is



**VIJAY SHANKAR
PRIMARY EXAMINER**